

ABSTRACT OF THE DISCLOSURE

An apparatus for performing a block operation includes a functional unit, which performs an operation on one or more block operands, and an accumulator memory. The
5 accumulator memory includes two independently interfaced memory banks. A control unit controls the memory banks in the accumulator memory so that each time the operation is performed, an operand is provided from one of the memory banks and a result is stored in the other memory bank. Since the memory banks are independently interfaced, the operand may be provided at the same time as the result is being stored.
10 Additionally, since the result is stored in a different memory bank than the operand, the operation may be restarted if an error occurs.